COMMUNITY AFFAIRS

DIVISION OF CODES AND STANDARDS
Residential Site Improvement Standards

Proposed Amendments: N.J.A.C. 5:21 - Table 4.3; Illustrations 1 of 14, 2 of 14, 4 of 14, 6 of 14, 7 of 14, 8 of 14, 9 of 14, 11 of 14, 12 of 14, and 14 of 14; Figure 4.1, 3 of 6, 5 of 6, and 6 of 6; Figure 7.1; 7.2; 7.5; 8.1.
Proposed New Rule: N.J.A.C. 5:21-1.10
Authorized by: Susan Bass Levin, Commissioner, Department of Community Affairs
Authority: N.J.S.A. 40:55D-40.4.

Calendar Reference: See summary below for explanation of exception to calendar requirement.

Proposal Number: PRN 2003-

Public Hearing , 2003

Submit written comments by November 1, 2003 to:

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Susan Bass Levin

Commissioner

The agency proposal follows:

Summary

Pursuant to P.L. 1993, c. 32, the Site Improvement Advisory Board is required to review the Residential Site Improvement Standards (RSIS) and make recommended changes on an annual basis. This proposal contains the Board's recommended changes for 2003. A detailed list of the changes contained in this proposal appears below.
Subchapter 1 General Provisions:

A new section is proposed to add a phase-in period when technical changes are made to the standards. Technical changes to the rules can require significant changes to the design of projects. In order for designers to be sure what technical standards their project will be reviewed under, they need to know about rule changes before they are enforced. In the past, the Department would set the operative date of the rule six months after it appeared in the New Jersey Register. Because many users of the RSIS do not subscribe to the New Jersey Register, they are not aware that the operative date has been set later than the effective date.

The proposed change will make it clear that there is a phase-in period for all new rules, and will obviate the need to post a separate effective date and operative date in the New Jersey Register.

Subchapter 4 Streets and Parking:

Table 4.3: The proposed amendment modifies the table to reduce the width of parallel parking lanes contained in the RSIS to 7 feet. The current table lists 8 feet as the width for parallel parking lanes. The 2001 version of the American Association of State Highway and Transportation Officials' (AASHTO) "Standard Specifications for a Policy on Geometric Design of Highways and Streets" cites 7 feet as the appropriate width for parallel parking lanes in residential areas. Therefore, the proposed change is consistent with the statutory requirement that any changes to the RSIS be based on authoritative sources. The Board is not proposing a change to the overall width of the various streets that contain a parallel parking lane. Keeping the current width for the street means that the parking lane becomes narrower, but the traveled way becomes larger. The Board feels that this is also in agreement with AASHTO, which states that travel lanes should be a minimum of 10 feet, but ideally should be 11 feet. The proposed change to the table will result in a traveled way of 16 feet for neighborhood streets (previously 14 feet) to travel lane widths of 10 feet, 10.5 feet, or 11 feet for other street types depending on whether the street has no parking lanes, one parking lane, or two parking lanes.

The street illustrations are proposed for amendment consistent with the changes discussed above. In addition, several other editorial changes are being made to the diagrams. For example, where the diagram refers to more than one intensity, the word "intensity" is changed to "intensities." The diagram showing Belgian block curb with a concrete gutter [Figure 4.1 (3 of 6)] is renamed so that the difference between Figures 4.1 (3 of 6) and 4.1 (4 of 6) is readily apparent. Figure 4.1 (6 of 6) is amended to add the words "not to scale" to the drawing. Street Illustration 14 of 14 is proposed for amendment to show the distance greater than 300 feet rather than 400 feet. The proposed change is a correction of the diagram so that it agrees with Illustration 13 of 14 and the existing rule language in Table 4.2, which limits the length of multifamily courts to 300 feet.

Subchapter 7 Stormwater Management:

An editorial change to Figure 7.2 is proposed to change the word "note" to "notes," since there are multiple items listed. An editorial change is made to 5:21 – 7.5(f)4.v(2): the word "ratio" is being changed to "value," since the expression listed is not a ratio.

Subchapter 8 Referenced Standards:

Finally, two changes are being proposed to Subchapter 8 to add a code section where a referenced standard is cited and to correct the address for the Insurance Services Office, Inc.

As the Department has provided a 60-day comment period for this notice of proposal, this notice is exempted from the rulemaking calendar requirements, pursuant to N.J.A.C. 1:30-3.3(a)5.

Social Impact

The proposed addition of the grace period language will have a positive social impact by making it clear that designers have six months from the time a rule appears as an adoption in the *New Jersey Register* before the applications they submit must meet the new rule. This should help designers to avoid redesigning plans because of changes to the standards.

The proposed parking lane width amendments will have no social impact. The overall street width remains the same and it is expected that, with the change, there will be no difference in the way the streets function or their effect on the public.

Economic Impact

The proposed grace period will help eliminate the need to redesign projects and may have a possible positive economic impact by lowering design costs.

The proposed streets changes will not affect the size or amount of material needed to construct streets under the standards and will therefore have no economic impact.

Federal Standards Statement

No Federal standards analysis is required because the amendments are not being proposed under the authority of, or in order to implement, comply with, or participate in, any program established under Federal law or State statute that incorporates or refers to Federal law, standards, or requirements.

Jobs Impact

The Department does not anticipate that the proposed amendments will result in the generation or loss of jobs.

Agriculture Industry Impact

The proposed amendments are not expected to have any impact on the agriculture industry**.**

Regulatory Flexibility Analysis

The proposed amendments and new rule impose technical compliance requirements on residential developers, most of which are “small businesses” within the meaning of the Regulatory Flexibility Act, N.J.S.A. 52:14B – 16, et seq. These technical requirements are described in the summary.

The proposed amendments are intended to further the objectives of establishing and maintaining uniform statewide standards for site improvements. Providing differential treatment for small businesses would defeat the purpose of the enabling legislation. Compared to the costs now applicable, compliance costs under the proposed amendments will not change. There are no professional services required for compliance with the proposed amendments that are not already necessary.

Smart Growth Statement

The proposed amendments and new rule would have no impact upon either the achievement of "smart growth" or the implementation of the State Development and Redevelopment Plan.

Full text of the proposal follows (additions indicated in boldface **thus**; deletions indicated in brackets [thus]):

5:21 – 1.10 Operative Date

(a) – (d) No change.

(e) For a period of six months following the operative date of a technical revision to the standards, applicants may submit a complete application to be reviewed under the standards in effect immediately prior to the technical revision. Provided that the application is deemed complete within the meaning of the Municipal Land Use Law, the planning board or zoning board of adjustment, as appropriate, shall review the application based on the technical standards in force immediately prior to the operative date of the revision to the standards. This grace period shall only apply to technical revisions to the standards.

(f) In the case of a subdivision or project for which a complete application has been submitted but for which preliminary approval has not been issued by the operative date of any technical change to the standards, review shall continue and approval shall be granted based on the standards in force immediately prior to the operative date of the revision to the standards.

TABLE 4.3 CARTWAY AND RIGHT-OF-WAY WIDTHS

STREET TYPE[a]	TOTAL AVG. DAILY TRAFFIC	TRAV-ELED WAY	NO. OF PARKING LANES[b]	PARKING LANE WIDTH	CART-WAY WIDTH	CURB OR SHOULDER[h]	SIDE-WALK OR GRADED AREA[j]	RIGHT-OF-WAY WIDTH[i]
RESIDENTIAL ACCESS a. Parallel Parking	1,500*							
Low intensity	*(loop-750 each half)	[20'] 21'	1	[8'] 7'	28'	None	1 SW 1 GA	50'
Medium intensity		[20'] 21'	1	[8'] 7'	28'	Curb	2 SW	50'
High intensity (on-street parking)		[20'] 21'	1	[8'] 7'	28'	Curb	2 SW	50'
b. Nonparallel Parking (all intensities)								
One-side parking		24'	1	18'		Curb	2 SW[n]	54'
Two-side parking		24'	2	36'		Curb	2 SW[n]	72'
c. No Parking High intensity (off-street parking)		20'	0	0'	20'	None	2 SW	50'
NEIGHBORHOOD (All intensities)	1,500	[14'] 16'	2	[16'] 14'	30'[c]	Curb	2 SW	50'
MINOR COLLECTOR[l] Low intensity[d] with no parking	3,500	20'	0	0'	20'	None	1 SW 1 GA	50'
Low intensity with one parking lane		[20'] 21'	1	[8'] 7'	28'	Curb	1 SW 1 GA	50'
Medium and high intensity with one parking lane		[20'] 21'	1	[8'] 7'	28'	Curb	2 SW	50'

Medium and high intensity with two parking lanes		[20'] 22'	2	[16'] 14'	36'	Curb	2 SW	60'
Medium and high intensity with off-street parking		22'	0	0'	22'	Curb or shoulder	2 SW	50'
MAJOR COLLECTOR[l]	7,500							
Low intensity		24'	0	0'	24'	None	2 SW	50'
Medium and high		24'	0	0'	24'	Curb or shoulder	2 SW	50' if curb, 54' if shoulder

TABLE 4.3 continued. CARTWAY AND RIGHT-OF-WAY WIDTHS

STREET TYPE[a]	TOTAL AVG. DAILY TRAFFIC	TRAV-ELED WAY	NO. OF PARKING LANES[b]	PARKING LANE WIDTH	CART-WAY WIDTH	CURB OR SHOUL-DER[h]	SIDE-WALK OR GRADED AREA[j]	RIGHT-OF-WAY WIDTH[i]
SPECIAL-PURPOSE STREETS								
Rural street[k]	500	20'	0	0'	20'	None	2 GA	40'
Rural lane[k]	200	18'	0	0'	[18']	None	2 GA	40'
Alley (one way)					9'			11'
Alley (two way)		18'	0	0'	[18']	None	2 GA	22'
Cul-de-sac (stem)[e]	250							
Marginal access street[f]								
Divided street[g]								
Multifamily access cul-de-sac[m]	1,000							

Multifamily court	Note[p]							

NOTES:

[a]See Table 4.2 for definitions of street hierarchy and N.J.A.C. 5:21-4.2 for definitions of low, medium, and high intensity of development.

[b]Parking lane refers to parallel parking, except in the case of residential access streets with nonparallel parking, which have perpendicular parking.

[c]The 30' cartway would accommodate two [8'] 7' parking lanes and [one 14' moving lane] a 16' traveled way.

[d]20' minor collector cartways are permitted only when there is no direct building lot access to or from the street in question.

[e]Cartway widths of cul-de-sac stems [and right-of-way requirements] should conform to the applicable street type. Right-of-ways for cul-de-sac stems shall extend a minimum of 8' beyond the cartway. Cul-de-sacs shall provide for a cartway turning radius of 40' and a right-of-way line 8' beyond the edge of the cartway.

[f]Cartway and right-of-way widths of marginal access streets and right-of-way requirements should conform to standards of either residential access or minor collector streets, as dictated by average daily traffic. If the classification is a minor collector requiring a 36' cartway, cartway width may be reduced to 28', since frontage is restricted to one side of the street.

[g]Cartway widths of divided streets should conform to standards of street classification, as dictated by anticipated average daily traffic, and be applied as aggregate dimensions of two street segments. Divided streets shall be provided with cut-throughs at a maximum of 1,200' intervals.

[h]See N.J.A.C. 5:21-4.3(c) for additional requirements.

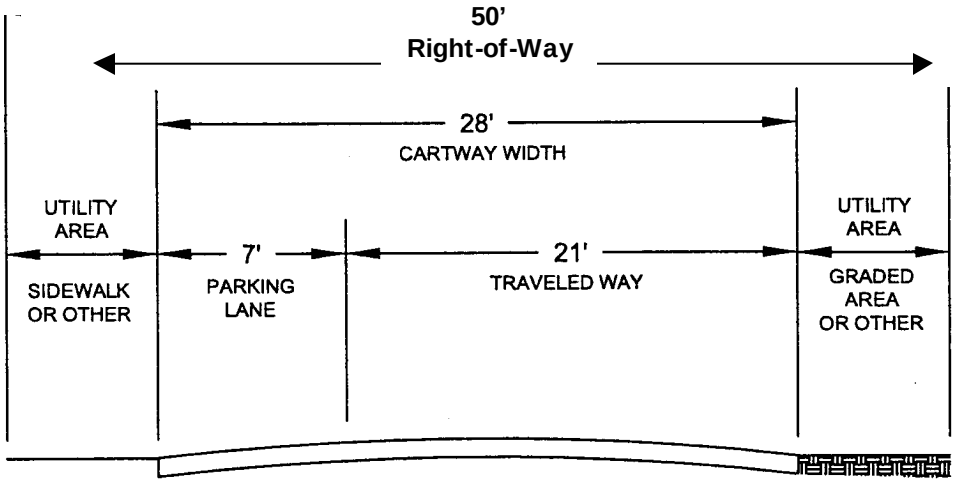
[i]Right-of-way width applies only to streets proposed for dedication as shown on approved plans.

[j]See N.J.A.C. 5:21-4.5(b) for additional requirements.

[k]Rural streets and rural lanes are permitted only within developments which do not exceed an average daily traffic count of 500 and 200, respectively.

RESIDENTIAL ACCESS
(low intensity)

Illustration 1 of 14

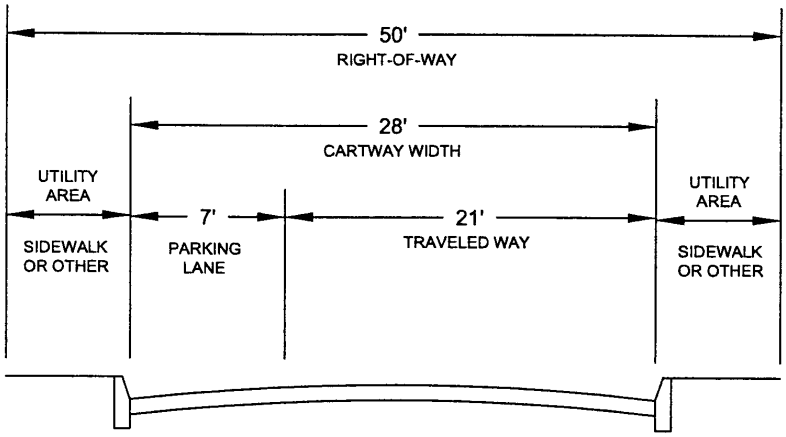


FOR ILLUSTRATIVE PURPOSES ONLY

TRAVELED WAY:	21 FEET
NUMBER OF PARKING LANES:	1
PARKING LANE WIDTH:	7 FEET
CARTWAY WIDTH:	28 FEET
CURB OR SHOULDER:	NONE
SIDEWALK OR GRADED AREA:	1 SW 1 GA
RIGHT-OF-WAY:	50 FEET

RESIDENTIAL ACCESS
(high intensity with on-street parking
and medium intensity)

Illustration 2 of 14

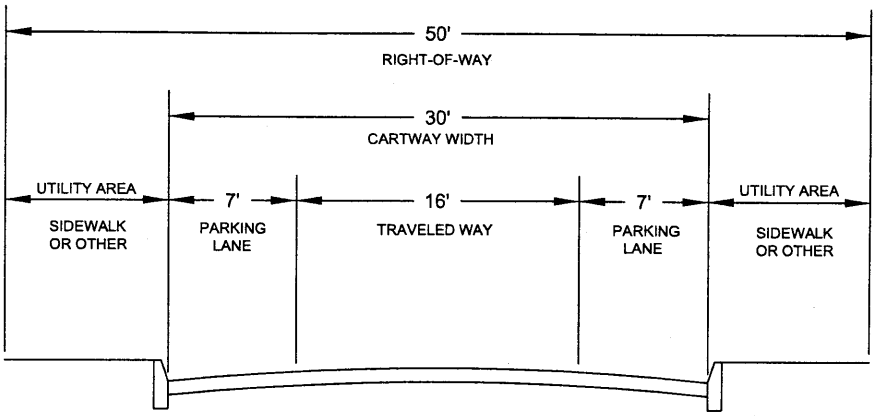


FOR ILLUSTRATIVE PURPOSES ONLY

TRAVELED WAY:	21 FEET
NUMBER OF PARKING LANES:	1
PARKING LANE WIDTH:	7 FEET
CARTWAY WIDTH:	28 FEET
CURB OR SHOULDER:	CURB
SIDEWALK OR GRADED AREA:	2 SW
RIGHT-OF-WAY:	50 FEET

NEIGHBORHOOD
(all intensities)

Illustration 4 of 14

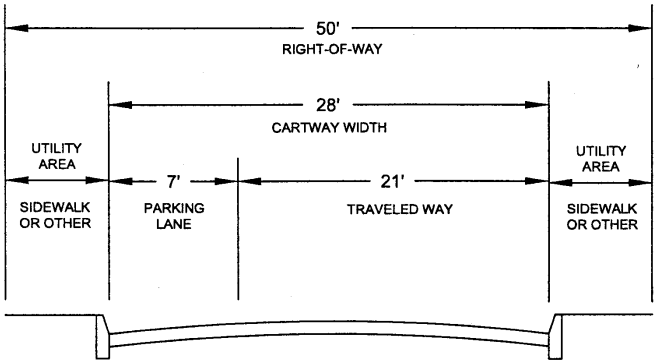


FOR ILLUSTRATIVE PURPOSES ONLY

TRAVELED WAY:	16 FEET
NUMBER OF PARKING LANES:	2
PARKING LANE WIDTH:	14 FEET
CARTWAY WIDTH:	30 FEET
CURB OR SHOULDER:	CURB
SIDEWALK OR GRADED AREA:	2 SW
Right - of – Way	50 FEET

MINOR COLLECTOR
(low, medium, and high intensities
with one parking lane)

Illustration 6 of 14

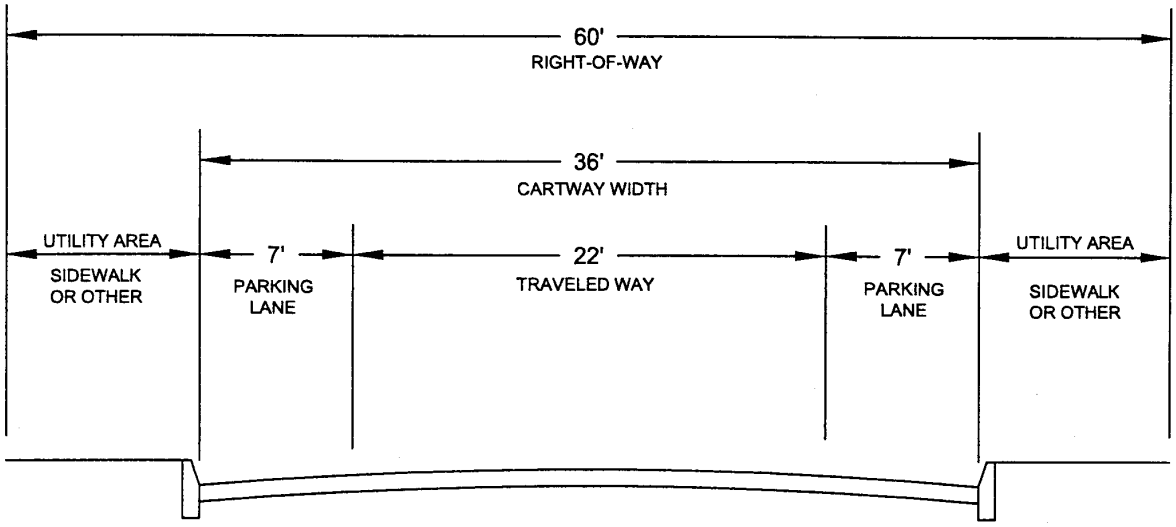


FOR ILLUSTRATIVE PURPOSES ONLY

TRAVELED WAY:	21 FEET
NUMBER OF PARKING LANES:	1
PARKING LANE WIDTH:	7 FEET
CARTWAY WIDTH:	28 FEET
CURB OR SHOULDER:	CURB
SIDEWALK OR GRADED AREA:	
low, one parking lane:	1SW, 1GA
medium, one parking lane:	2 SW
high, one parking lane:	2 SW
RIGHT-OF-WAY:	50 FEET

MINOR COLLECTOR
(medium and high intensities
with two parking lanes)

Illustration 7 of 14

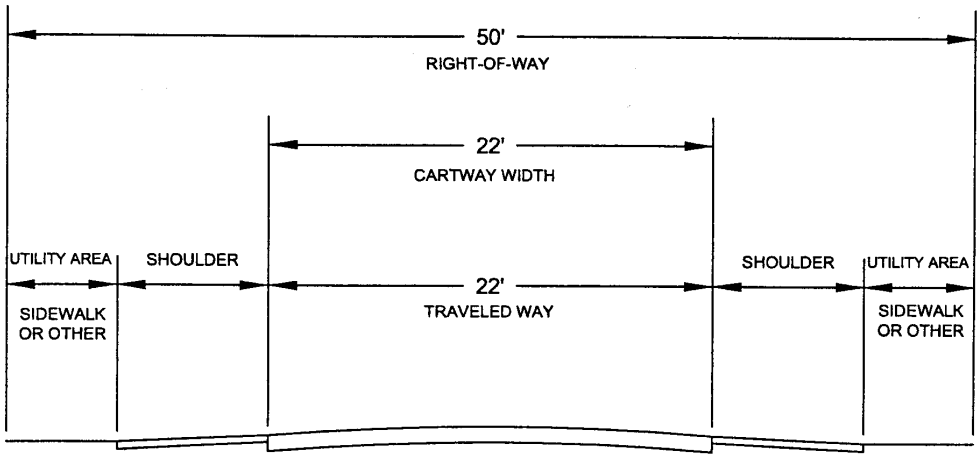


FOR ILLUSTRATIVE PURPOSES ONLY

TRAVELED WAY:	22 FEET
NUMBER OF PARKING LANES:	2
PARKING LANE WIDTH:	14 FEET
CARTWAY WIDTH:	36 FEET
CURB OR SHOULDER:	36 FEET
SIDEWALK OR GRADED AREA:	2SW
RIGHT-OF-WAY:	60 FEET

MINOR COLLECTOR
(medium and high intensities
with off-street parking and
shoulders)

Illustration 8 of 14

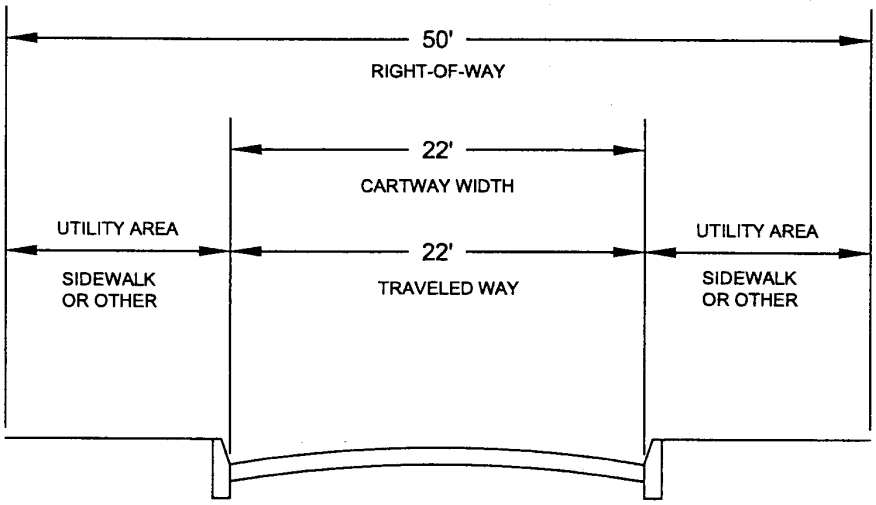


FOR ILLUSTRATIVE PURPOSES ONLY

TRAVELED WAY:	22 FEET
NUMBER OF PARKING LANES:	0
PARKING LANE WIDTH:	0 FEET
CARTWAY WIDTH:	22 FEET
CURB OR SHOULDER:	SHOULDER
medium intensity:	4 FEET
high intensity:	6 FEET
SIDEWALK OR GRADED AREA:	2 SW
RIGHT-OF-WAY:	50 FEET

MINOR COLLECTOR
(medium and high intensities
with off-street parking and
curb)

Illustration 9 of 14

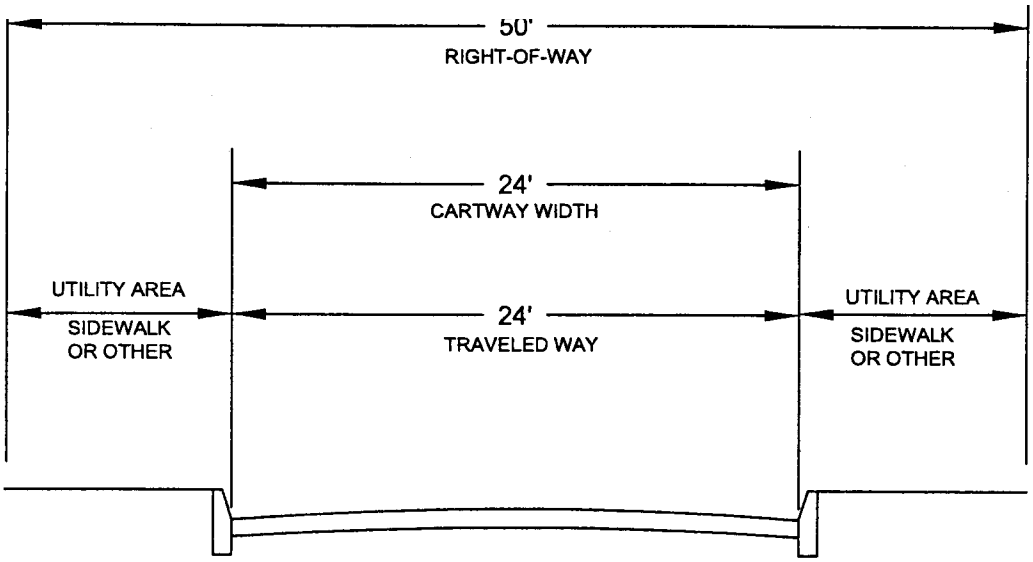


FOR ILLUSTRATIVE PURPOSES ONLY

TRAVELED WAY:	22 FEET
NUMBER OF PARKING LANES:	0
PARKING LANE WIDTH:	0 FEET
CARTWAY WIDTH:	22 FEET
CURB OR SHOULDER:	CURB
SIDEWALK OR GRADED AREA:	2 SW
RIGHT-OF-WAY:	50 FEET

MAJOR COLLECTOR
(medium and high intensities with curb)

Illustration 11 of 14

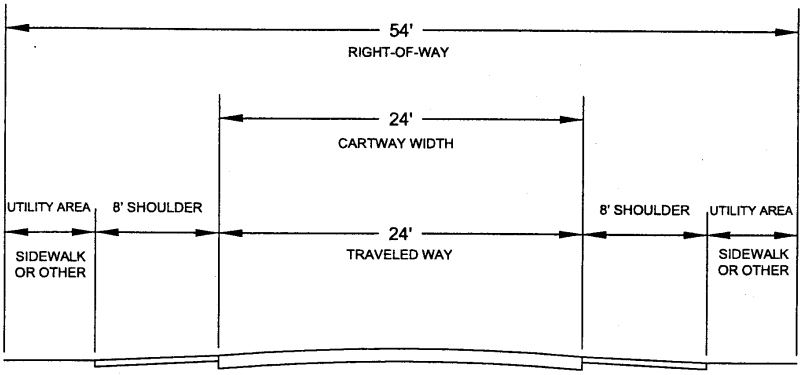


FOR ILLUSTRATIVE PURPOSES ONLY

TRAVELED WAY:	24 FEET
NUMBER OF PARKING LANES:	0
PARKING LANE WIDTH:	0 FEET
CARTWAY WIDTH:	24 FEET
CURB OR SHOULDER:	CURB
SIDEWALK OR GRADED AREA:	2 SW
RIGHT-OF-WAY:	50 FEET

MAJOR COLLECTOR
(medium and high intensities
with shoulders)

Illustration 12 of 14



FOR ILLUSTRATIVE PURPOSES ONLY

TRAVELED WAY:	24 FEET
NUMBER OF PARKING LANES:	0
PARKING LANE WIDTH:	0 FEET
CARTWAY WIDTH:	24 FEET
CURB OR SHOULDER:	SHOULDER
SIDEWALK OR GRADED AREA:	2 SW
RIGHT-OF-WAY:	54 FEET

MULTIFAMILY ACCESS
(CUL-DE-SAC)

Illustration 14 of 14

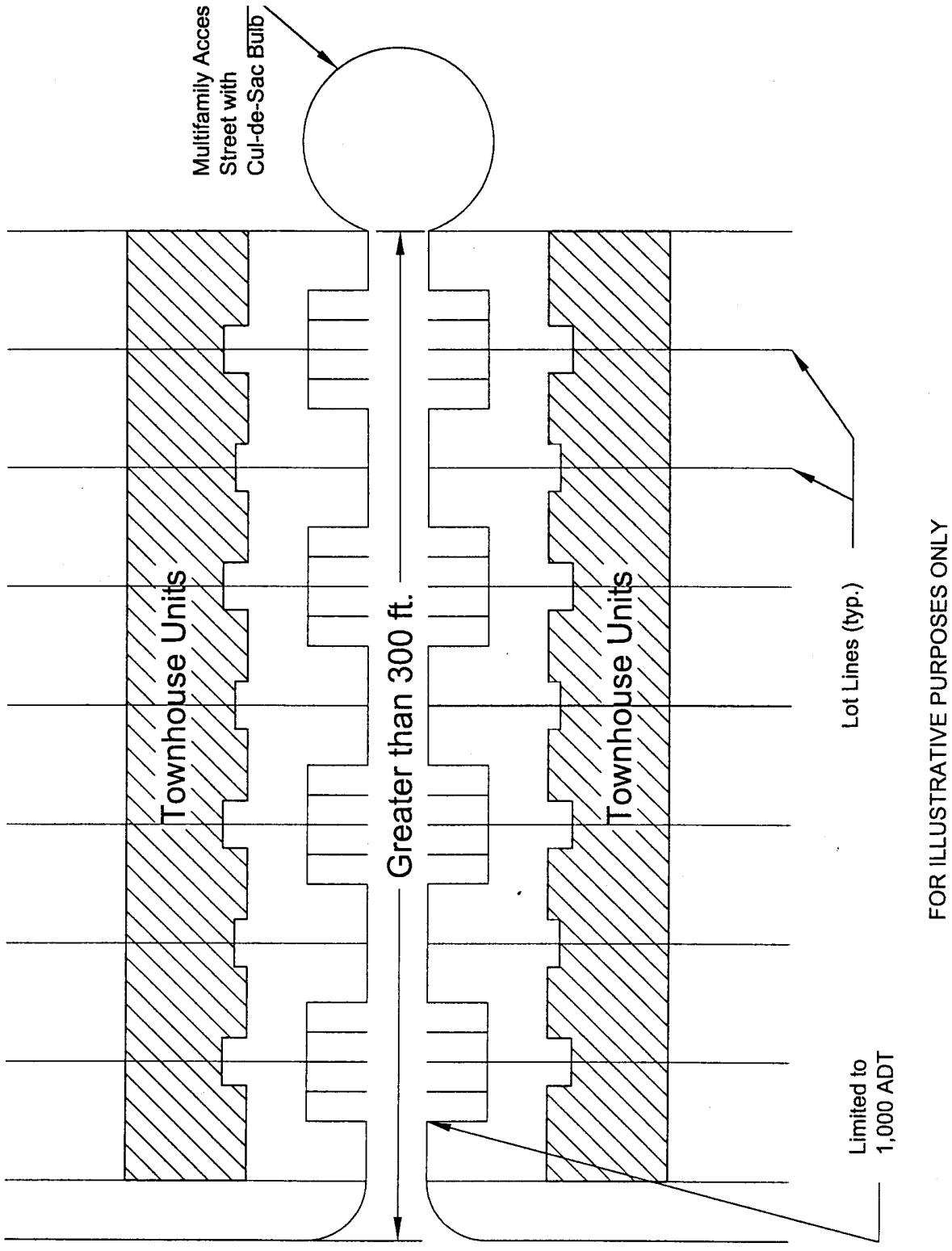
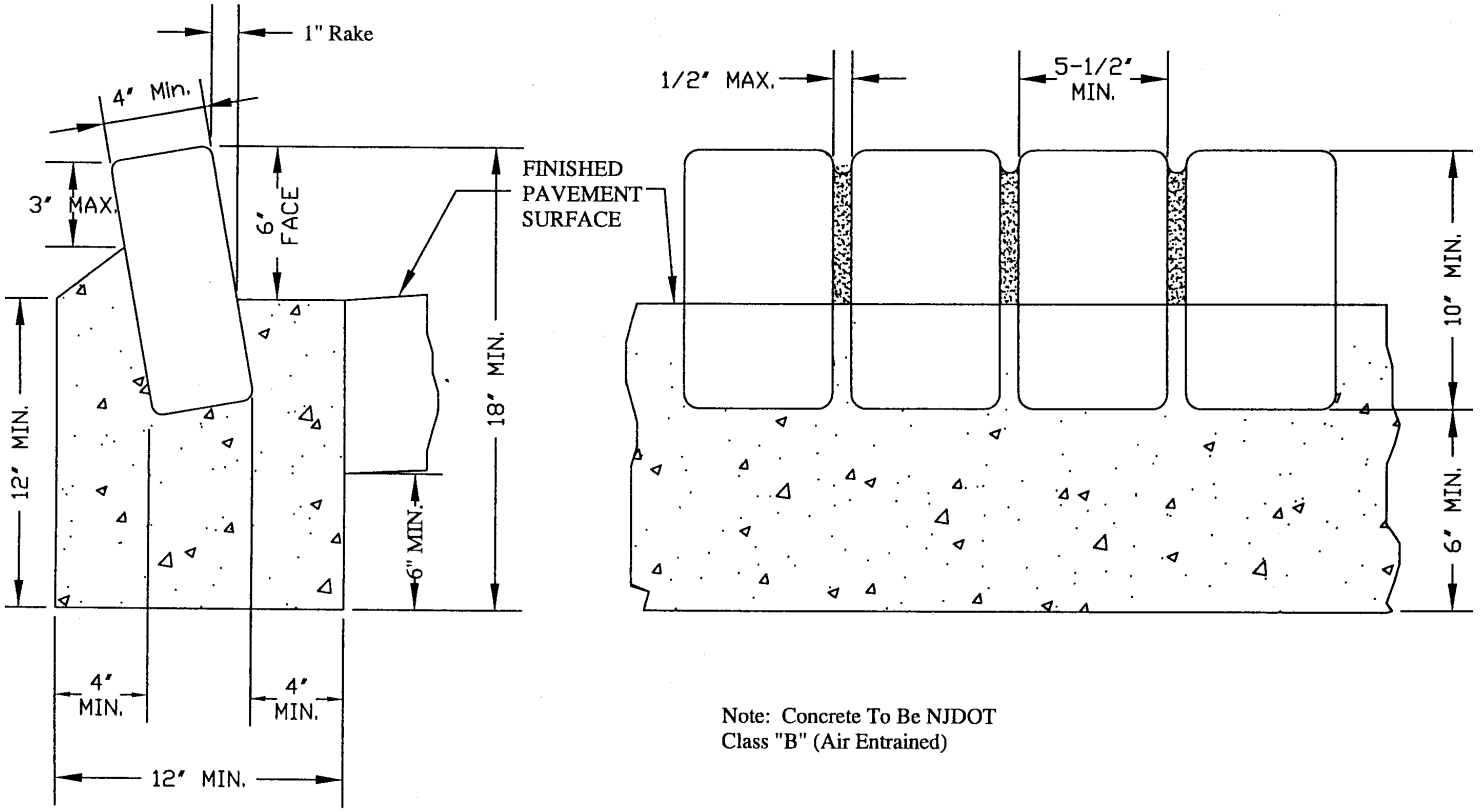


Figure 4.1
(3 of 6)

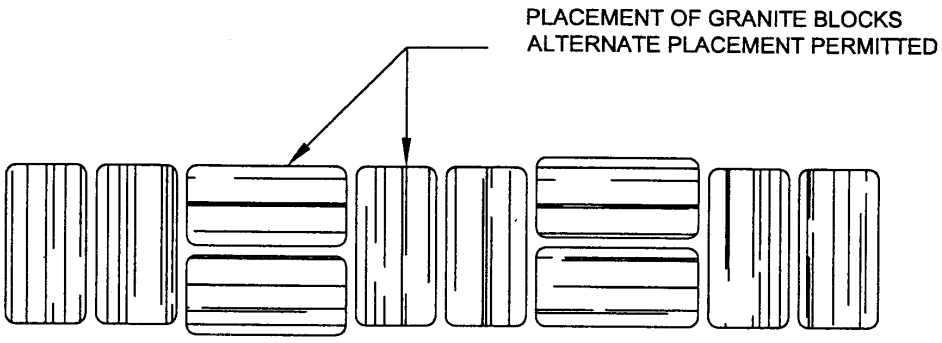
NOTE: JOINTS TO BE 1/2" WIDE USING I-2 MIX CEMENT MORTAR STRUCK WITH CONCRETE TOOL



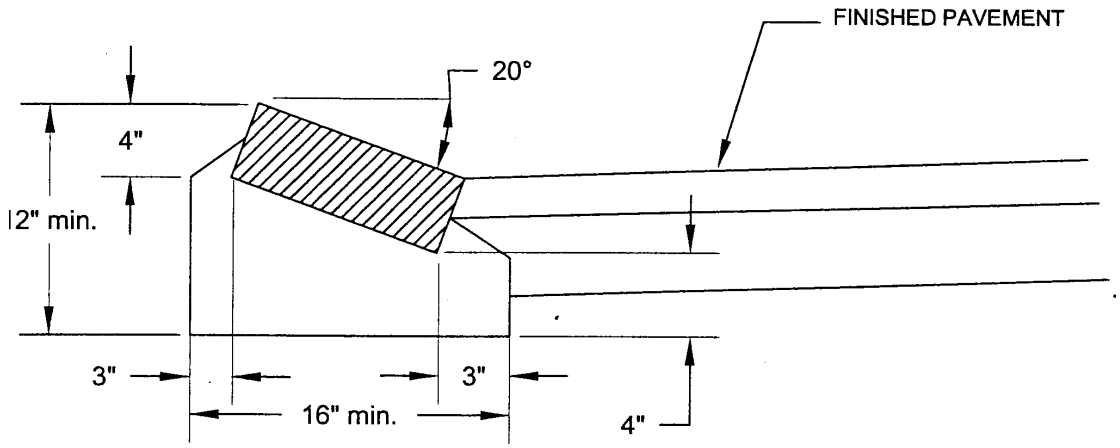
Note: Concrete To Be NJDOT Class "B" (Air Entrained)

VERTICAL GRANITE BLOCK CURB (With Concrete Gutter)

(NOT TO SCALE)



PLAN

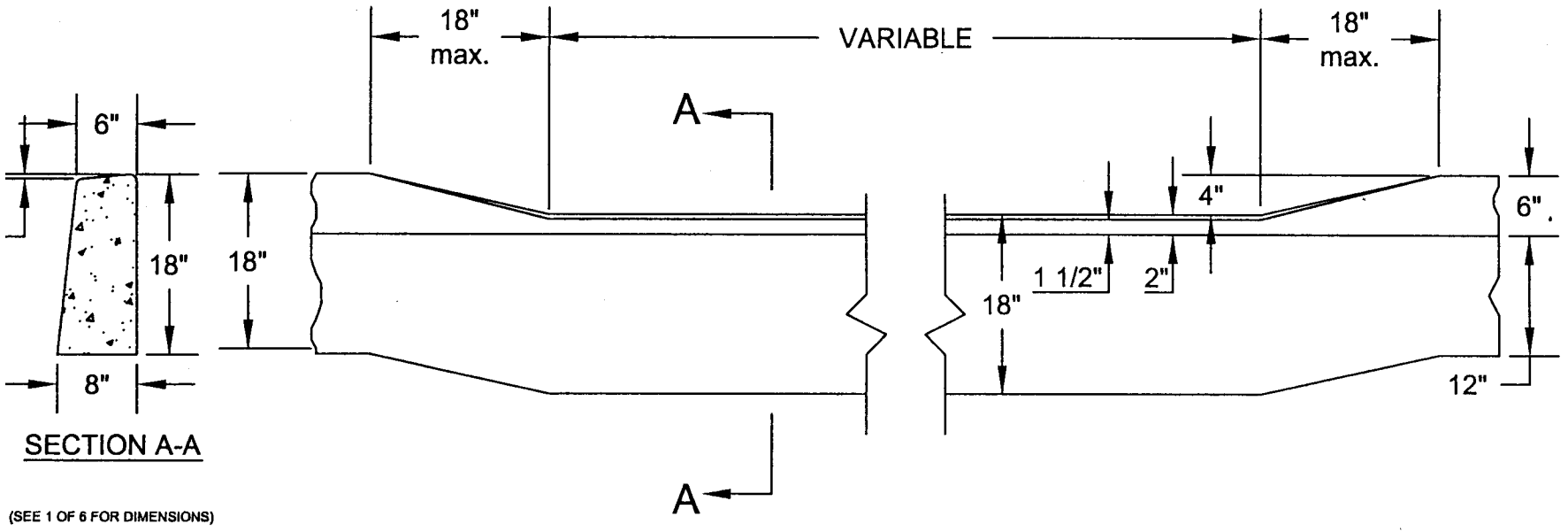


SECTION

MOUNTABLE GRANITE BLOCK CURB

(NOT TO SCALE)

Figure 4.1
(6 of 6)



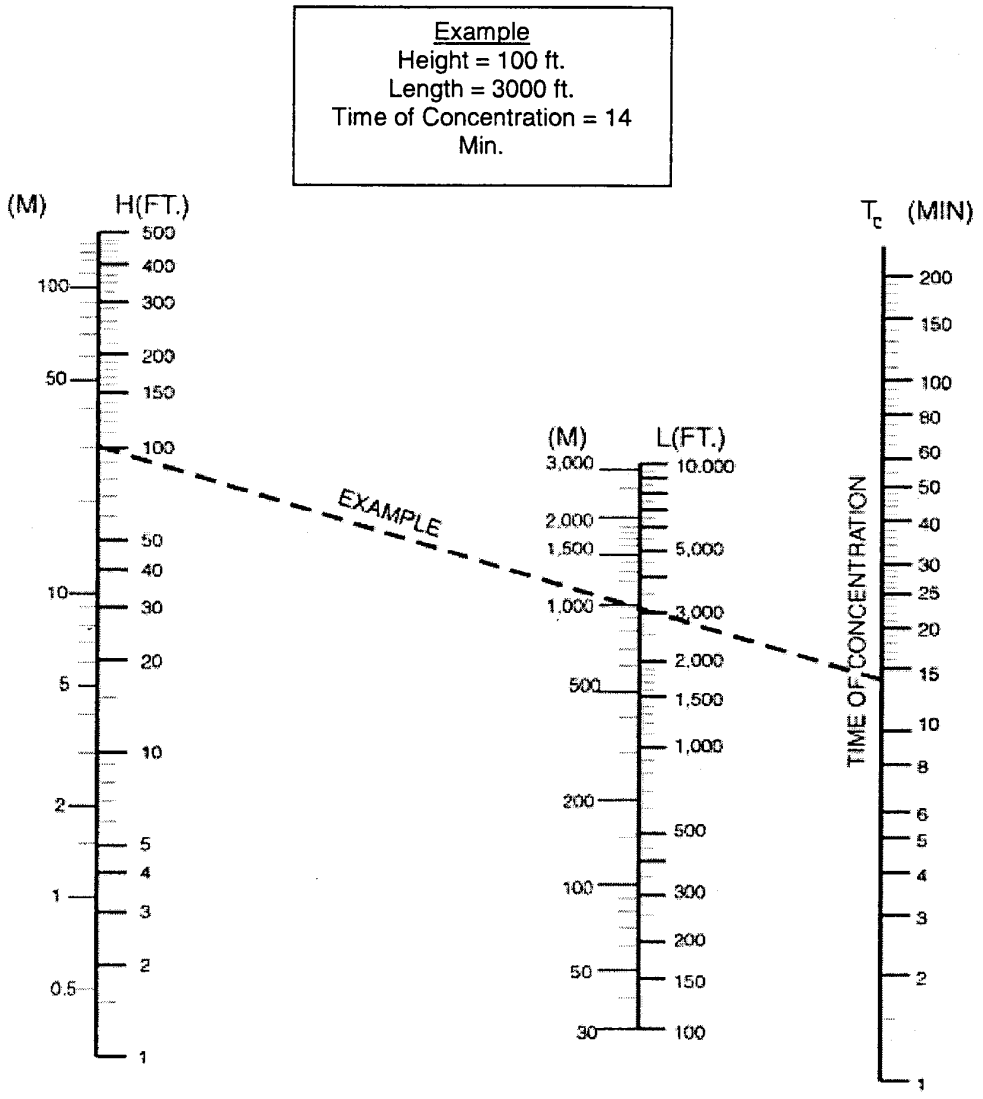
(SEE 1 OF 6 FOR DIMENSIONS)

DROP CURB AT DRIVEWAYS

DETAIL SHOWN IS FOR CONCRETE CURB. DETAIL FOR GRANITE BLOCK CURB SHALL FOLLOW SAME DIMENSIONS IN THE DRIVEWAY AREA.

(NOT TO SCALE)

Figure 7.1 Time of Concentration



Notes:

Use Nomograph T_c for natural basins with well-defined channels, for overland or bare earth, and for mowed grass roadside channels.

5:21 – 7.2 Runoff estimation techniques

(a) – (c) No change.

(d) Design engineers shall use a consistent method to calculate peak rate of runoff and volume when computing runoff hydrographs. If [either] TR-55, TR-20, or HEC-1 is used to calculate peak rate of runoff, then the same method shall be used to determine volume. If the [rational method] Rational Method is used for peak flow calculations, the design engineer shall use the Modified Rational [method] Method to calculate peak volume to be used for basin routing. A maximum drainage area of 20 acres shall be used for the Modified Rational Method.

5:21 – 7.5 Detention basins and other stormwater facilities

(a) - (e) No change.

(f) The following list of general structural criteria shall be used to design stormwater detention basins.

1. – 3. No change.

4. Detention basin berms and embankment ponds, as follows:

i. – iv. No change.

v. Seepage control along pipes extending through embankments shall be controlled by use of a filter and drainage diaphragm, unless it is determined that antiseep collars will adequately serve the purpose.

(1) No change.

(2) When antiseep collars are used in lieu of a drainage diaphragm, they shall have a watertight connection to the pipe. Maximum spacing shall be approximately 14 times the minimum projection of the collar measured perpendicular to the pipe. Collar material shall be compatible with the pipe materials. The antiseep collar(s) shall increase by 15 percent the seepage path along the pipe. When antiseep collars are used in lieu of a drainage diaphragm, the design engineers shall use the following criteria to determine the size and number of antiseep collars.

Let V = vertical projection and minimum horizontal projection of the antiseep collar in feet.

Let L = length in feet of the conduit within the zone of saturation, measured from the downstream side of the riser to the toe drain or point where the phreatic line intercepts the conduit, whichever is shorter.

Let n = number of antiseep collars.

The [ratio] value of the length of the seepage (L + 2nV) is to be at least 1.15. Antiseep collars should be equally spaced along part of the barrel within the saturated zone at distances of not more than 25 feet.

vi. Closed–circuit spillways designed for pressure flow must have adequate antivortex devices. To prevent clogging of the conduit, an appropriate trash guard shall be installed at the inlet or riser.

vii-xi. No change.

xii. The mix, design, and testing of concrete shall be consistent with the size requirements of the job. Mix requirements or necessary strength shall be specified. The type of cement, air entrainment, slump, aggregate, or other properties shall be specified as necessary. All concrete is to consist of a workable mix that can be placed and finished in an acceptable manner. Necessary curing shall be specified. Reinforcing steel shall be placed as indicated on the plans and shall be held securely in place during concrete placement. Subgrades and forms shall be installed to line and grade, and forms shall be mortar tight and unyielding as the concrete is placed.

xiii.–xv. No change

5. – 7. No change.

5:21 – 8.1 Referenced standards

(a) The following is a list of the standards referenced in this chapter. The standards are listed by the promulgating agency of the standard, the standard identification, the edition of the standard, the title of the standard, and the section(s) of this code that reference the standard. The standards listed in this chapter are not adopted or to be used in their entirety unless the rules specifically so state. The use of the standards included in this chapter is limited to those specific areas of the standard for which this chapter directs the user to the standard.

1. American Association of State Highway and Transportation Officials (AASHTO), 444 North [Capital] Capitol Street, N.W., Suite 249, Washington, DC 20001. Tel. (202) 624-5800 or (800) 231-3475.

Standard reference number	Title	Referenced in N.J.A.C. section number
*******	*******	******
1993 Edition	Guide for Design of Pavement Structures	Figure 4.2 Figure 4.3 Figure 4.4 Figure 4.5 Table 4.9

2. – 7. No change.

8. Insurance Services Office, Inc. (ISO), [7 World Trade Center, New York, New York 10048. Tel. (212) 898 – 6000] 545 Washington Boulevard, Jersey City, New Jersey 07310 – 1686. Tel. (201) 469 – 2000 or (800) 888 – 4476.

Standard reference number	Title	Referenced in N.J.A.C. section number
©1980 Edition 6 - 80	Fire Suppression Rating Schedule	5:21 – 5.2(e)

9. – 19. No change.